NCIP Version 2 – the Whys Behind the Changes

Library Support

After years of lackluster interest in NCIP from the libraries, the NCIP Implementers Group (NCIP-IG) is hearing specific pleas for a “better NCIP” from groups of libraries, typically consortia involved in cross-platform resource sharing. They see the specific benefits that a widely-adopted NCIP will offer and they are explicit in their demand that such an NCIP become widely available. Though a few of these quotes are rather long, they convey the needs and the expected benefits of a new version of NCIP.

Comments from Al Carlson at the Tampa Bay Library Consortium:

“Effective NCIP communication among ILS systems is one of the key factors that will—or may—keep libraries and the vendors who sell to them viable for another few decades.

Without it, libraries may find themselves supplanted by Google, Amazon, and a few open source software enterprises such as The Library Thing.

This may happen anyway, but it will happen more quickly and more surely without NCIP.”

“NCIP is part of end user empowerment. It helps libraries respond to the end user’s cry of “I want it all, and I want it now!” with a sincere and hearty, “We’ve got that right here!””

“But right now, NCIP seems kind of inflexible and inarticulate and slow to grow out of that stage. It would be well positioned for success, if this were 1990. But it’s not even close to 1990 anymore.”

“We want to stay in business; we want your companies to stay in business; we want libraries to remain viable. Oh, and by the way we want library patrons to get what they want when they want it.”

Comments from Jo Budler and David Namiotka at the State Library of Ohio:

“I would really like to help in any way that would expedite the implementation of NCIP. I know that there are many others in the state of Ohio who would support this.”

“At the present time, there is a great deal of interest in Ohio in improving the Statewide Resource Sharing mechanism and NCIP is instrumental.”

“We are hoping that the creation and acceptance of a new NCIP standard will give the vendors the guidance they need to create the necessary NCIP pieces to allow for seamless circulation related communication.”

“It is easy to see that if NCIP was successful in our environment, there would be a number of important benefits gained for the Ohio library community. It
obviously will provide for easier access to a much larger and more diverse
collection of materials for patrons who otherwise would not have this access.
There would be a significant reduction in the number of man-hours spent
statewide doing unnecessary duplicate manual work. It will also allow libraries
to make different local collection development decisions, since they will have
easy access to other materials via our resource sharing solution.”

“We have been waiting on NCIP for a long time and it seems like it is always
around the corner, but we are never quite there. The current workflow
problems we face in the absence of a working NCIP implementation are
hindering our ability to grow our statewide resource sharing service. We are
making every effort to increase the number of participating libraries, but it is
likely this will be a constant struggle until we are able to get NCIP fully
functional. The State Library and all OLS: MORE participating libraries are
hoping that these problems can be solved in a timely manner.”

Industry Support

The group of vendors actively pushing for version 2 polled themselves at the
most recent NCIP-IG meeting and all were committed to supporting version 2.
These vendors are: Envisionware, Polaris Library Systems, OCLC, Ex Libris,
SirsiDynix, 3M, Relais, and Innovative.

Types of Changes

For the past year NCIP-IG has been working to remove the perceived hurdles to
implementation centering on three main areas: streamlining and simplifying
the requirements, improving usability, and addressing concerns raised by self-
service and broker applications.

Under simplifying and streamlining, changes include making all scheme-value
pairs simple string values with an optional authoritative scheme attribute.
Scheme-value pairs were considered confusing by many, especially novice
implementers, and they added message overhead, repeated several times in
some cases. Replacing them with string values makes them easier to
understand and reduces the overall size of the message. Providing an optional
mechanism for identifying the authority governing the supported list of string
values allows the values to be validated in cases where it is considered
necessary.

Under improving usability, changes include a method to handle extensibility
and a better handling of problem or error responses. An extensibility
mechanism allows the protocol to better adapt to unanticipated future uses.
Extensions also may help to identify needed functions and features that could
be incorporated in future versions of the protocol. Through extensions, these
features could be implemented and field tested to prove their value before being
formally adopted. The error handling mechanism has been reworked from the
perspective of providing better information about the source of (and even
potential fixes for) the problem being reported. Errors can now be reported through a top-level element to address situations where nothing sensible can be done with the request. Optional elements provide the ability to describe (in human readable terms) the problem and even identify the value that is the likely cause.

Under issues raised by self-service and broker applications, changes include making headers optional and making it possible to return lists of values in a single response. Optional headers are another way that version 2 messages will be smaller than their version 1 counterparts. Additionally, several services were reviewed with an eye towards more efficient use of available bandwidth. Requests to look up a user and check in transactions are two places where information that in version 1 would have required that multiple requests be sent to the responder can now be obtained with a single message. All of this additional data is optional, so only those implementations that obtain value for it need to use it.

The change summary document accompanying the version 2 draft includes far more specific detail on the specific changes. Every change that has been included in the version 2 draft has a specific reason behind it—and that reason relates to making the NCIP standard more useful, more implementable, and more broadly applicable.